ABSTRACT OF THE DISCLOSURE

An exposure apparatus includes a light source for emitting exposure light, an illumination optical system illuminating an original on which a pattern is formed by the exposure light emitted from the light source, a projection optical system projecting the pattern to a photosensitive object, a first photodetector, disposed in a portion for receiving light from an optical path between the light source and a portion where the original is placed, for monitoring an emission light amount from the light source, and a processing system. The processing system obtains information regarding light exposure provided to at least an optical element included in one of the illumination optical system and the projection optical system, estimates a change in transmittance of the optical element on the basis of the information obtained and corrects a proportional coefficient for the light amount detected by the first photodetector and the emission light amount from the light source on the basis of the estimated change of transmittance.